

STEM challenge LEGO

EASY

BUILD A LEGO MARBLE MAZE

CONSTRUCT POWERED LEGO CAR

DESIGN A LEGO BOAT

CREATE A LEGO TOWER

BUILD A CATAPULT

BUILD A SIMPLE ELECTRICAL CIRCUIT

BUILD A SIMPLE GEAR TRAIN

CREATE A SIMPLE BALANCE SCALE

DESIGN A SIMPLE PULLEY SYSTEM

BUILD A BRIDGE

CREATE A LEGO PENDULUM

DESIGN A LEGO WATER FILTER

DESIGN A LEGO MODEL OF A SOLAR-POWERED VEHICLE

CREATE A WEATHER VANE TO MEASURE WIND DIRECTION

DESIGN A MULTI-FLOOR LEGO ELEVATOR

DESIGN A WIND-POWERED LEGO VEHICLE

BUILD A RUBE GOLDBERG MACHINE

CONSTRUCT A MODEL OF THE SOLAR SYSTEM

DESIGN A ROLLER COASTER MODEL

CREATE A HYDRAULIC LIFTING SYSTEM

HARD

DESIGN A SUSPENSION BRIDGE MODEL

CONSTRUCT A WORKING LEGO CRANE

BUILD A LEGO MODEL OF A FUNCTIONING ROBOTIC VEHICLE

BUILD A LEGO MODEL OF A ROBOTIC SORTING MACHINE

DESIGN AN AUTONOMOUS ROBOTIC ROVER.

STEM checklist LEGO

EASY

MODERATE

1. **What is the primary purpose of the study?**

1. **What is the primary purpose of the study?**

HARD

For more information, contact the Office of the Vice President for Research and Economic Development at 319-273-2500 or research@uiowa.edu.

Page 1 of 1

Page 1 of 1

STEM

planning

LEGO

NAME:

DATE:

CHALLENGE

MATERIALS

PROCEDURE

DRAW

REFLECTION

Credits:

